### CHARTER FOR AN

# INTERAGENCY WORKING GROUP FOR EARTH SCIENCE APPLICATIONS BETWEEN

# NASA EARTH SCIENCE ENTERPRISE APPLICATIONS DIVISION AND

USDA RESEARCH, ECONOMICS, AND EDUCATION; MARKETING AND REGULATORY PROGRAMS; NATURAL RESOURCES AND ENVIRONMENT; FARM AND FOREIGN AGRICULTURAL SERVICES; AND OFFICE OF THE CHIEF ECONOMIST

The NASA/USDA Interagency Working Group for Earth Science Applications (IWGESA) is established to improve cooperation and foster awareness between the two sponsoring agencies in Earth observations, observations systems, Earth system models, Earth process predictions resulting from NASA research and development and benchmarking the assimilation of said observations and predictions into USDA designated decision support tools. The IWGESA is an implementation mechanism of the "Memorandum of Understanding between the National Aeronautics and Space Administration, Office of Earth Science, Applications Division, and the United States Department of Agriculture, Research, Education, and Economics Division, for Cooperation in Earth Sciences," executed by Administrator O'Keefe and Secretary Veneman on 30 May 2003.

## **Purpose and Functions**

The primary purpose of the IWGESA is to increase the effective use of NASA Earth Science Enterprise remote sensing data and scientific models in support of USDA-sponsored research, development, and operational activities. Specifically, the IWGESA will:

- 1. Identify areas of potential interagency collaboration based upon the shared goals of remote sensing data acquisition, modeling, and applications in the following focus areas:
  - A. Carbon Management: Studies of carbon sequestration assessment;
  - B. Invasive Species: Studies through environmental models;
  - C. Water Management and Conservation: Studies of water cycle science;
  - D. Agriculture Efficiency: Studies of site specific to global scale agriculture and forest monitoring and productivity;
  - E. Air Quality Management: Studies of site specific to global scale atmospheric measurements and predictions;
  - F. Disaster Management: Preparation, mitigation, response, and recovery;
  - G. Resource Inventory and Monitoring: Improving the timeliness, scope, and consistency of ongoing monitoring programs;

- H. Homeland Security: Preparation, mitigation, response, and recovery regarding man-made threats to food, water, and other essential support systems that are the mandated responsibility of USDA.
- 2. Benchmark existing and evolving USDA decision support tools and systems that rely on geospatial information and Earth science information, and integrate NASA-sponsored Earth observations and model output into such systems to improve the operational decision support for USDA agencies.
- 3. Develop collaborative solicitations that address USDA mandates through the incorporation of NASA earth science research results, related technology, and systems engineering.

The USDA and NASA and their respective agencies and offices will manage their own activities and use their own resources, including their own funds, in pursuing these objectives. Each party will carry out its separate activities, as mutually agreed through the IWGESA, in a coordinated and mutually beneficial manner. Resources may be exchanged in support of this Charter through supplemental interagency agreements.

#### Structure

The IWGESA will be co-chaired by the Deputy Undersecretary for Research, Education, and Economics, USDA, and the Director, Earth Science Applications Division, Office of Earth Science, NASA, or their designated representatives. The co-Chairs may appoint an Executive Secretary.

The working group should include, but not be limited to, USDA agency representatives from the following Mission Areas:

- Research, Education, and Economics Mission Area, including the Cooperative State Research Education and Extension Service, the Economic Research Service, the National Agricultural Statistics Service, and the Agricultural Research Service;
- Marketing and Regulatory Programs Mission Area, including the Animal and Plant Health Inspection Service;
- Natural Resource and Environment Mission Area, including the Natural Resources Conservation Service and the Forest Service;
- Farm and Foreign Agricultural Service Mission Area, including the Farm Services Administration, the Foreign Agricultural Service, and the Risk Management Agency;
- Office of the Chief Economist.

NASA representation to the working group will consist of Earth science research and applications program managers and scientists from the cognizant program areas, including, but not limited to:

- A. Carbon Management
- B. Invasive Species
- C. Water Management and Conservation
- D. Agriculture Efficiency
- E. Air Quality Management
- F. Disaster Management
- G. Resource Inventory and Monitoring
- H. Homeland Security.

### Meetings

The co-Chairs will call meetings and approve and provide the meeting agendas. The working group will meet quarterly for the first year, and thereafter on a suitable schedule as decided by the group members, but no less than twice a year. Minutes of each meeting will be prepared by the Executive Secretary and distributed in a timely manner to the working group.

## Reports

The IWGESA shall report, annually and in writing, to the Undersecretary for Research, Education, and Economics, USDA, and the Associate Administrator, Office of Earth Science, NASA, on progress toward meeting its objectives. The first report is due January 2005.

#### **Termination**

Either NASA or USDA may withdraw from the working group at any time by providing written notice to the other agency.

Ghassem R. Asrar
Associate Administrator
For Earth Science
National Aeronautics and Space
Administration

3/9/04
Date

Joseph J. Jen
Under Secretary
Research, Economics, and Education
United States Department of
Agriculture

3/8/04
Date

William T. Hawks
Under Secretary
Marketing and Regulatory Programs
United States Department of
Agriculture

3/3/84 Date

J. B. Penn
Under Secretary
Farm and Foreign Agricultural Services
United States Department of
Agriculture

3/4/04

Data

**Under Secretary** 

Chief Economist

Agriculture

United States Department of

Agriculture

Natural Resources and Environment

United States Department of